

United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
09/809,053	03/16/2001	Eyal Rosin	968/34	968/34 4674	
75	590 02/08/2005		EXAMINER		
DR MARK FRIEDMAN,LTD			TREAT, WILLIAM M		
c/o Bill Polkingham Discovery Dispatch		ART UNIT	PAPER NUMBER		
9003 Florin Way			2183	<u>.</u>	
Upper Marlbore	o, MD 20772		DATE MAILED: 02/08/200	DATE MAILED: 02/08/2005	

Please find below and/or attached an Office communication concerning this application or proceeding.

•		Application No.	Applicant(s)			
Office Action Summary		09/809,053	ROSIN ET AL.			
		Examiner	Art Unit			
		William M. Treat	2183			
Period f	The MAILING DATE of this communication aported or Reply	pears on the cover sheet with the o	correspondence address			
THE - Exte afte - If th - If NO - Failt Any	MAILING DATE OF THIS COMMUNICATION. Insions of time may be available under the provisions of 37 CFR 1. If SIX (6) MONTHS from the mailing date of this communication. If period for reply specified above is less than thirty (30) days, a reply period for reply is specified above, the maximum statutory period are to reply within the set or extended period for reply will, by statuting received by the Office later than three months after the mailing period patent term adjustment. See 37 CFR 1.704(b).	136(a). In no event, however, may a reply be tirely within the statutory minimum of thirty (30) day will apply and will expire SIX (6) MONTHS from the cause the application to become ABANDONE	nely filed rs will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).			
Status						
1)[\]	Responsive to communication(s) filed on 18 (October 2004.				
2a)⊠	This action is FINAL . 2b) Thi	s action is non-final.				
3)[_]	Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.					
Disposit	ion of Claims					
5)□ 6)⊠	Claim(s) <u>1-20</u> is/are pending in the application 4a) Of the above claim(s) is/are withdra Claim(s) is/are allowed. Claim(s) <u>1-20</u> is/are rejected. Claim(s) is/are objected to. Claim(s) are subject to restriction and/or	awn from consideration.				
Applicat	ion Papers					
9)[The specification is objected to by the Examine	er.				
10)	10) The drawing(s) filed on is/are: a) accepted or b) objected to by the Examiner.					
	Applicant may not request that any objection to the		• •			
11)	Replacement drawing sheet(s) including the correct The oath or declaration is objected to by the E					
		xammer. Note the attached Office	Action of form PTO-152.			
	under 35 U.S.C. § 119					
a)	Acknowledgment is made of a claim for foreign All b) Some * c) None of: 1. Certified copies of the priority document 2. Certified copies of the priority document 3. Copies of the certified copies of the priority application from the International Burea See the attached detailed Office action for a list	ts have been received. ts have been received in Applicationity documents have been received u (PCT Rule 17.2(a)).	on No ed in this National Stage			
Attachmen	t(s)					
	e of References Cited (PTO-892)	4) Interview Summary				
3) 🔲 Infor	e of Draftsperson's Patent Drawing Review (PTO-948) mation Disclosure Statement(s) (PTO-1449 or PTO/SB/08) r No(s)/Mail Date	Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	atent Application (PTO-152)			

Application/Control Number: 09/809,053 Page 2

Art Unit: 2183

1. Claims 1-20 are presented for examination.

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the

basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on

sale in this country, more than one year prior to the date of application for patent in the United States.

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all

obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the

manner in which the invention was made.

4. This application currently names joint inventors. In considering patentability of the

claims under 35 U.S.C. 103(a), the examiner presumes that the subject matter of the various

claims was commonly owned at the time any inventions covered therein were made absent any

evidence to the contrary. Applicant is advised of the obligation under 37 CFR 1.56 to point out

the inventor and invention dates of each claim that was not commonly owned at the time a later

invention was made in order for the examiner to consider the applicability of 35 U.S.C. 103(c)

and potential 35 U.S.C. 102(e), (f) or (g) prior art under 35 U.S.C. 103(a).

5. Claims 1-20 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative,

under 35 U.S.C. 103(a) as obvious over Lavi et al. (WO 99/42922).

6. The grounds for rejecting claims 1-14, set forth in the examiner's previous action (mailed

5/10/2004), continue and are hereby incorporated by reference.

Application/Control Number: 09/809.053

Art Unit: 2183

7. As to claims 15 and 18, by depicting the (off-core execution units)/computational units (61, 62, 63, 64) as separate entities in Fig. 1 Lavi taught them as separate from said core processor, to the extent claimed.

Page 3

- 8. As to claims 16 and 19, the examiner takes official notice of the fact that it is commonplace for processors with multiple functional units, such as Lavi's, to have redundant functional units capable of interchangeably performing the tasks appropriate to their type. Applicants' claim language fails to distinguish over Lavi, well-known prior art, and such a dictionary-based interpretation of applicant's claim language. It might also be concluded that Lavi inhrerently taught his functional units were interchangeable since he did not seek to distinguish them by function.
- 9. As to claims 17 and 20, applicants' specification describes starting on p. 8 that the interface (52) accepts relevant portions of the decoded CLIW instruction and passes them to offcore execution units for execution. If one looks at Fig. 1 of Lavi, his element 7 of what the examiner has identified as the core processor must inherently have circuitry performing the same function or his device would not work.
- 10. Claim 17 and 20 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.
- 11. The examiner explained in paragraph 9, supra, that applicants' specification described their interface as accepting relevant portions of the decoded CLIW instruction and passing them

Art Unit: 2183

to off-core execution units for execution. This is not an "off-core-execution-unit interface operative to control said at least one off-core execution unit" nor is it "controlling said off-core execution unit via said off-core-execution-unit interface". The interface merely seems to be circuitry to pass the appropriate portions of the CLIW instruction to the off-core execution units for execution. Applicants' claim language would seem to represent new matter in that it imparts control capabilities to the interface not previously disclosed.

- 12. Claims 17 and 20 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.
- 13. See paragraph 11, *supra*, for a relevant explanation.
- 14. Claim 20 is recites the limitation "off-core-execution-interface" in lines 3-4. There is insufficient antecedent basis for this limitation in the claim.
- 15. Applicant's arguments filed 10/18/2004 have been fully considered but they are not persuasive.
- 16. Applicants argue on behalf of claims 1-20, in substance:
- (a) their drawings differ from Lavi's,
- (b) their design choice as described by elements of their specification distinguishes them from Lavi and would be non-obvious,
- (c) and their new claims distinguish over the art.
- 17. As to 16(a), if one were merely allowed to reconfigure a patent's drawings and rename elements of a drawing while still setting forth claims in a new application to the capabilities of the prior art, no ones processor patents would have any value.

Application/Control Number: 09/809,053 Page 5

Art Unit: 2183

18. As to 16(b), the design choice described in applicants' specification may be patentably distinct but that choice has not been made clear in applicant's claim language.

- 19. As to 16(c), see paragraphs 7-14, *supra*.
- 20. On page 3, line 7 of applicants' specification applicants describe their off-core execution units as: "External off-core processing units 54 are connected to a core processor 50 in an interchangeable and selectable manner by means of an interface 52." The examiner is suggesting applicants amend each of their current independent claims to define their off-core execution units as: "external off-core processing units connected to a core processor in an interchangeable and selectable manner by means of an interface" and cancel claims 15-20. This would leave applicants with claims which distinguish over the prior art of record, in the examiner's judgment, though not necessarily over other art which the examiner might find in another search.
- 21. Any inquiry concerning this communication should be directed to William M. Treat at telephone number (571) 272-4175. The examiner works at home on Wednesdays but may normally be reached on Wednesdays by leaving a voice message using his office phone number. The examiner also works a flexible schedule but may normally be reached in the afternoon and evening on three of the four remaining weekdays.
- 22. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

WILLIAM M. TREAT